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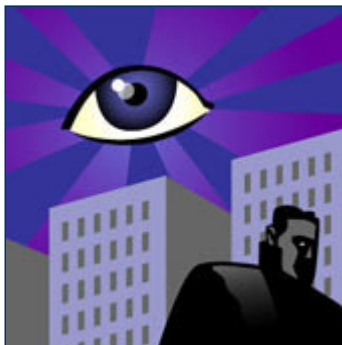
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Commentary

Scary Stuff

Robert Ellis Smith 11.26.07, 6:00 AM ET



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How They're Watching You

Government and corporate officials responsible for compliance with privacy laws in Canada and Europe are using a whole new language in 2007. Much of the jargon has passed by the American public. So listen up. This is important.

At their annual meeting this fall in Montreal, there was little of the traditional talk among the international privacy people about the nuts and bolts of data protection. Instead, there were urgent and distressed discussions about "uberveillance," "ambient technology," "ubiquitous computing," "ingestible bugs" and nanotechnology.

Robert Ellis Smith



More By Robert Ellis Smith

The terms may be overlapping and may in fact be somewhat synonymous. They all refer to an environment in which electronic media are everywhere, gathering and processing information in a seamless way, beyond the control of each human being. The discussions began a few years ago with recognition of a coming "Internet of things," much as public awareness of the Internet began in the 1980s with talk of an "information super highway."

In Pictures: How They're Watching You

In short, this new environment may render obsolete the three decades' old regime for protecting privacy, which merely gives certain rights of access to citizens. What good is checking the accuracy of your own information in a system if the essence of the system is to keep track of where you are? What good is notification about a new system if it's quite simply everywhere?

One form of this new technology is *human-area networking*, which permits the human

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body to be the conduit for electronic transmissions--of information, instructions, behavior and a lot more.

"We are entering a new era in privacy. Current concepts of consent will not be adequate for this," says Ian Kerr, Canada Research Chair in Ethics, Law and Technology at the University of Ottawa, who seems to be the scholar in North America most aware of this trend.

And how about an RFID identifying chip that may be swallowed by humans--an *ingestible bug*. Last February, **Eastman-Kodak** (nyse: [EK](#) - [news](#) - [people](#)), no longer your father's camera company, filed for patent protection for this new device. The patent filing suggested potential uses, including monitoring "bodily events," tracking how a person's digestive track is absorbing medicine, or verifying how a specific medicine is interacting with other drugs in one's body. The RFID tag would disintegrate eventually, the company says.

European officials are using terms like *ubiquitous computing* and *pervasive or invasive computing*. One of them said that *ambient intelligence* is an even greater challenge to European privacy enforcers than terrorism.

Ambient intelligence refers to an environment in which electronic devices support human beings in their daily activities in a way that conceals the computers' inner workings. This will involve embedding tiny chips inside the body, customizing them to the individual and anticipating needs of the individual.

Michael G. Michael, a theologian and technology historian at the University of Wollongong, in New South Wales, Australia, says that he originated the term *uberveillance* to describe the new environment. The stem "uber" means "over" or "super" in German. He thinks the pervasive monitoring will lead to increased cases of insanity and mental distress. "Mental illness will become an increasingly confronting factor as these issues develop," he frowned.

Another threatening term often used in these contexts is *nanotechnology*, which refers to a miniaturization of technology allowing applications originally deemed impossible.

Still another term is *biobanking*, which, in the words of an **IBM** (nyse: [IBM](#) - [news](#) - [people](#)) developer, "aims to empower researchers with unprecedented access to critical molecular and clinical information to accelerate a more personalized paradigm of medicine." Biobanks--sometimes called biorepositories or tissue banks--are a critical resource for 21st century clinical research and medicine because they naturally generate lots of genomic and phenotypic data. "Combining the wealth of genetic and molecular information now emerging with patient records and other clinical records will help researchers understand disease at the molecular level, ultimately leading to innovative new personalized therapies and treatments."

Even--especially-- children are already subjects of this pervasive monitoring. Web sites like [Neopets.com](#), [Webkinz.com](#), [Surveyasmash.com](#) and [Barbie.com](#) manipulate children by offering bonus points for loyalty to products and to the site. Children are coerced into visiting on a regular basis. They are forced to give care, love and attention to fictional characters and animals. Collecting information on child-oriented Web sites is regulated by American law (even though kids, of course, have little difficulty circumventing the parental consent rules), but manipulating children online is not regulated.

Surveillance systems require huge investments, which require government backing, and so it's important for taxpayers--not to mention consumers and parents--to stay up to date on these trends. As to be expected, an industry segment is growing around the new emphasis. Just this month, O'Reilly Media announced a conference next May for "the location industry," to discuss "location-based technology."

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